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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/821,240	04/08/2004	Nisar Ahmed Khan	3077-6384US	9732
24247	7590	09/27/2006	EXAMINER	
TRASK BRITT P.O. BOX 2550 SALT LAKE CITY, UT 84110			NEGIN, RUSSELL SCOTT	
			ART UNIT	PAPER NUMBER
			1631	

DATE MAILED: 09/27/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/821,240	KHAN ET AL.	
	Examiner	Art Unit	
	Russell S. Negin	1631	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-46 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☐ Claim(s) ____ is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☒ Claim(s) 1-46 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. ____. |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____. |

DETAILED ACTION

Election/Restrictions

Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-25, drawn to a method of creating a peptide database, classified in class 702, subclass 19. If this group is elected, then the below mentioned species election(s) are required.
- II. Claim 26, drawn to a method of implementing a computer system for presenting biomolecular sequence data, classified in class 702, subclass 19.
- III. Claims 27-30, drawn to a method of producing a pharmaceutical, classified in class 435, subclass 6.
- IV. Claims 31-32, drawn to an improvement in a method of screening a candidate compound for biological activity, classified in class 435, subclass 6. If this group is elected, then the below mentioned species election(s) are required.
- V. Claims 33-46, drawn to a method for identifying biologically active peptide fragments, classified in classes 435 and 702, subclasses 6 and 19, respectively. If this group is elected, then the below mentioned species election(s) are required.

The inventions are distinct, each from the other because of the following reasons:

Inventions I through V are directed to related processes. The related inventions are distinct if the (1) the inventions as claimed are either not capable of use together or can have a materially different design, mode of operation, function, or effect; (2) the inventions do not overlap in scope, i.e., are mutually exclusive; and (3) the inventions as claimed are not obvious variants. See MPEP § 806.05(j). In the instant case, the inventions as claimed serve different functions. Furthermore, the inventions as claimed do not encompass overlapping subject matter and there is nothing of record to show them to be obvious variants.

While Invention I is a method of creating a peptide database, Invention II is a method of implementing a computer system for presenting biomolecular sequence data; this presentation of data is distinct from a method of creating a database. Invention III is a method of producing a pharmaceutical, which is distinct from creating a peptide database, or presenting data from a biomolecular sequence database. While Invention IV is an improvement in a method of screening a candidate compound for biological activity, this is distinct from a method of creating a peptide database, a method of presenting data from a database, or a method of producing a pharmaceutical. While Invention V is a method of identifying biologically active peptide fragments, this method is distinct from creating a peptide database, implementing a computer system for presenting biomolecular sequence data, producing a pharmaceutical, or an improvement in a method of screening a candidate compound for biological activity. Invention III is distinct because it is the only method which results in the production of a pharmaceutical. Invention IV is distinct because it is the only improvement to a method

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of screening candidate molecules for biological activity. Invention V is distinct because it is the only method of identifying biologically active peptide fragments. The five methods thus serve five distinct functions and thus there is undue burden in searching all claimed subject matter.

Because these inventions are independent or distinct for the reasons given above and there would be a serious burden on the examiner if restriction is not required because the inventions have acquired a separate status in the art due to their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

Species Elections for Group I:

If applicant elects Group I, there are two species elections from which applicant is required to select one specie from each of the two groups.

Category A: inflammatory mediator (claim 15)

Applicant must elect an inflammatory mediator from the group listed in claim 15. Each inflammatory mediator is distinct with its own set of biochemical properties. There would be undue burden in searching all the mediators together.

Category B: relation of peptides (claims 22-25)

Applicant must select whether peptides are related to Beta-catenin (claim 22), C-reactive protein (claim 23), matrix metalloproteinase-2 (claim 24), and Bruton's tyrosine

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kinase (claim 25). There would be undue burden in searching all relations to proteins together.

Species Election for Group IV:

If applicant elects Group IV, there is one species election which is required.

Category C: Tables of Peptides (claim 32)

Applicant must elect a peptide from the tables listed in claim 32. Each Table is a unique list of peptides with their own physical properties. There would be undue burden in searching all of the Tables together.

Species Election for Group V:

If applicant elects Group V, there is one species election which is required.

Category D: protein type (claims 35, 37-40)

Applicant must elect a protein from amongst the list shown in claims 35 and 37-40.

For claim 35, the protein of interest is hCG.

For claim 37, the protein of interest is Beta-catenin.

For claim 38, the protein of interest is C-reactive protein.

For claim 39, the protein of interest is matrix metalloproteinase-2.

For claim 40, the protein of interest is Bruton's tyrosine kinase.

Each protein is physically distinct with its own set of chemical properties. Searching all proteins together would result in undue burden.

Applicant is required under 35 U.S.C. 121 to elect a single disclosed species for prosecution on the merits to which the claims shall be restricted if no generic claim is finally held to be allowable. Currently, claims 1-21 are generic for Group I, claims 31-32 are generic for Group IV, and claims 33-36 and 41-46 are generic for Group V.

Applicant is advised that a reply to this requirement must include an identification of the species that is elected consonant with this requirement, and a listing of all claims readable thereon, including any claims subsequently added. An argument that a claim is allowable or that all claims are generic is considered nonresponsive unless accompanied by an election.

Upon the allowance of a generic claim, applicant will be entitled to consideration of claims to additional species which depend from or otherwise require all the limitations of an allowable generic claim as provided by 37 CFR 1.141. If claims are added after the election, applicant must indicate which are readable upon the elected species.

MPEP § 809.02(a).

Applicant is advised that the reply to this requirement to be complete must include (i) an election of a species or invention to be examined even though the requirement be traversed (37 CFR 1.143) and (ii) identification of the claims encompassing the elected invention.

The election of an invention or species may be made with or without traverse. To reserve a right to petition, the election must be made with traverse. If the reply does not distinctly and specifically point out supposed errors in the restriction requirement, the election shall be treated as an election without traverse.

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Should applicant traverse on the ground that the inventions or species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the inventions or species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C.103(a) of the other invention.

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Papers related to this application may be submitted to Technical Center 1600 by facsimile transmission. Papers should be faxed to Technical Center 1600 via the central PTO Fax Center. The faxing of such pages must conform with the notices published in the Official Gazette, 1096 OG 30 (November 15, 1988), 1156 OG 61 (November 16, 1993), and 1157 OG 94 (December 28, 1993)(See 37 CFR § 1.6(d)). The Central PTO Fax Center Number is (571) 273-8300.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Russell Negin, Ph.D., whose telephone number is (571) 272-1083. The examiner can normally be reached on Monday-Friday from 7am to 4pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Supervisor, Andrew Wang, Supervisory Patent Examiner, can be reached at (571) 272-0811.

Any inquiry of a general nature or relating to the status of this application should be directed to Legal Instrument Examiner, Yolanda Chadwick, whose telephone number is (571) 272-0514.

Information regarding the status of the application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR.

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Status information for unpublished applications is available through Private PAIR only.
For more information on the PAIR system, contact the Electronic Business Center
(EBC) at 866-217-9197 (toll-free).

RSN

19 September 2006



19 Sept 2006



JOHN S. BRUSCA, PH.D
PRIMARY EXAMINER